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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/681,051

10/07/2003

Simon Gibson

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EXAMINER

MOUZON, LAJUANIA N

ART UNIT

PAPER NUMBER

2109

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
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3 MONTHS

03/16/2007

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

Office Action Summary

Application No.

10/681,051

Applicant(s)

GIBSON ET AL.

Examiner

La Juania N. Mouzon

Art Unit

2109

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 10/07/2007.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-43 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-43 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 10/07/2007 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date 10/07/2003, 10/07/2004.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____.

DETAILED ACTION

Information Disclosure Statement

1. The information disclosure statement (IDS) submitted on 10/7/2003 is in compliance with the provisions of 37 CFR 1.97. Accordingly, the information disclosure statement is being considered by the examiner.
2. The information disclosure statement (IDS) submitted on 10/7/2004 is in compliance with the provisions of 37 CFR 1.97 with the exception of reference C of the Non-Patent Literature documents: Akami. "How it Works" which fails to comply with 37 CFR 1.98(a)(2), which requires a legible copy of each cited foreign patent document; each non-patent literature publication or that portion which caused it to be listed; and all other information or that portion which caused it to be listed. Accordingly, the information disclosure statement is being considered by the examiner with the exception of the reference mentioned above.

Drawings

3. The drawings are objected to as failing to comply with 37 CFR 1.84(p)(5) because they include the following reference character(s) not mentioned in the description: 20 and 24. Corrected drawing sheets in compliance with 37 CFR 1.121(d), or amendment to the specification to add the reference character(s) in the description in compliance with 37 CFR 1.121(b) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should

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include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

4. The drawings are objected to as failing to comply with 37 CFR 1.84(p)(5) because they do not include the following reference sign(s) mentioned in the description: 30b (**pg. 8 line(s) 2, 7, 13, and 15**). Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

Specification

5. The use of the trademark America Online, Inc (**pg. 11 line(s) 20**) has been noted in this application. It should be capitalized wherever it appears and be accompanied by the generic terminology.

Although the use of trademarks is permissible in patent applications, the proprietary nature of the marks should be respected and every effort made to prevent their use in any manner which might adversely affect their validity as trademarks.

6. The disclosure is objected to because of the following informalities: the number "194" should be "104" (**pg. 10 line(s) 5**).

Appropriate correction is required.

7. The disclosure is objected to because of the following informalities: missing the "e" in the word Advantages (**pg. 10 line(s) 36**).

Appropriate correction is required.

Claim Rejections - 35 USC § 112

8. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

9. Claim 11 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

10. Where applicant acts as his or her own lexicographer to specifically define a term of a claim contrary to its ordinary meaning, the written description must clearly redefine the claim term and set forth the uncommon definition so as to put one reasonably skilled in the art on notice that the applicant intended to so redefine that claim term. *Process Control Corp. v. HydReclaim Corp.*, 190 F.3d 1350, 1357, 52 USPQ2d 1029, 1033 (Fed. Cir. 1999). The term “web service” in claim 11 is used by the claim to mean “a Network service”, while the accepted meaning is “a software system identified by a URI [RFC 2396], whose public interfaces and bindings are defined and described using XML. Its definition can be discovered by other software systems. These systems may then interact with the Web service in a manner prescribed by its definition, using XML based messages conveyed by Internet protocols (**“Web Services Architecture Requirements”**)).” The term is indefinite because the specification does not clearly redefine the term.

From hereinafter of the examination the Examiner will use the definition of a web server for web service.

Claim Rejections - 35 USC § 102

11. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

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12. Claims 1, 2, 5, 6, 8, 10-12, 16-18, 21, 22, 24, 26-28, 31, 32, 36, 38 and 42 are rejected under 35 U.S.C. 102(b) as being anticipated by Farber et al. (US 6,185,598) filed on 2/10/98 and patented on 2/6/01.

Figure 4 from Farber et al. is reproduced below.

13. In regards to claim 1 Farber et al. disclose, a process for providing a link to a preferred mirror instance within a plurality of mirror instances of a content store, comprising the steps of:

- a. determining localization information for each mirrored instance of the content store to each network from which users connect (**Col. 11 line(s) 4-58, teaches determining the localization information for each mirrored instance of the content store on the network that a users can connect to.**);
- b. storing the localization information (**Col. 11 line(s) 18-22, teaches whereas this information is stored in a table.**);
- c. receiving a request from a user that includes a link to mirrored content (**Col. 7 line(s) 17, teaches whereas the origin server receives the link. As stated, in Col. 7 line 37-38 the reflector can take the place of the origin server**);
- d. querying the localization database to determine a preferred mirror to the user, based upon the stored localization information (**Fig. 4 #B3-1 and Col. 8 line(s) 20-22, teaches querying the localization database, of the stored localization information, to determine the preferred mirror.**);

- e. dynamically generating a localized link to the preferred mirror (Col. 8 line(s) 22-25, teaches dynamically generating a link to the preferred mirror.);
- f. and transmitting the localized link to the user (Fig. 4 #B3-3 and Col. 8 line(s) 50-53, teaches transmitting the localized link to the user.).

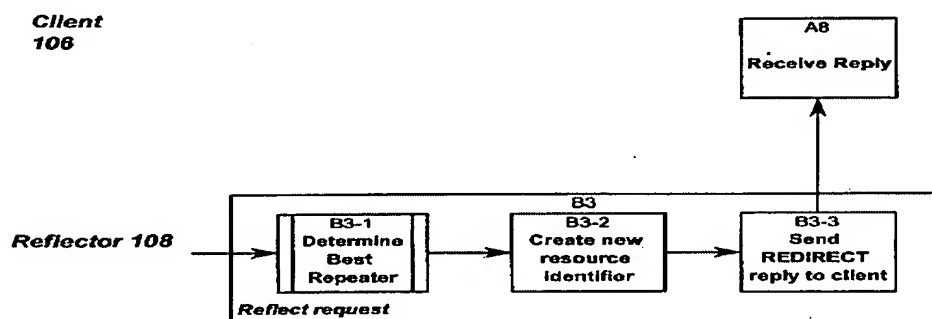


Fig. 4

14. In regards to claims 2 and 18 Farber et al. disclose, automatically directing the user to the local mirror instance when the user selects the link (Col. 8 line(s) 50-53, teaches sending a redirecting command to automatically direct the user to the local mirror instance.).

15. In regards to claims 5 and 21 Farber et al. disclose, wherein the localization information comprises a transmission cost for each mirrored instance of the content store to each network from which users connect (Col. 13 line(s) 56-62, teaches whereas the localization information comprises a transmission cost. Also as mentioned in ¶13, this information is stored in tables.).

16. In regards to claims 6, 22, and 36 Farber et al. disclose, wherein the localization information comprises mirror server load information (**Col. 12 line(s) 24-29, teaches whereas the localization information comprises load information**).

17. In regards to claims 8, 24, and 38 Farber et al. disclose, wherein the localization information comprises cost information (**Col. 11 line(s) 18-22, teaches whereas the localization information comprises cost information in the Link Cost Table.**).

18. In regards to claims 10 and 26 Farber et al. disclose, wherein the localization information is stored in a database (**Col. 4 line(s) 16-19, teaches a database where the localization information is stored.**).

19. In regards to claims 11 and 27 Farber et al disclose, wherein the localization information is stored at a web service (**Col. 7 line(s) 37-38, teaches whereas the localization information is stored at a web server.**).

20. In regards to claims 12, 28, and 42 Farber et al. disclose, wherein the request comprises a web page (**Col. 8 line(s) 31-35, teaches a whereas the request is a web page. Being that the definition for HTTP according to Microsoft Dictionary 5th Ed. is, the protocol used to carry requests from a browser to a Web server and to transport pages from Web servers back to the requesting browser. Further stating that is it almost universally used on the Web.**)

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21. In regards to claim 16 Farber et al. disclose, wherein the localized link comprises an HTTP link **(Col. 8 line(s) 31-35, teaches whereas the localized link is a HTTP link.)**.

22. In regards to claim 17 Farber et al. disclose, a process for providing a link to a preferred mirror instance within a plurality of mirror instances of a content store, comprising the steps of:

- g. determining localization information for each mirrored instance of the content store to each network from which users connect **(Col. 11 line(s) 4-58, teaches determining the localization information for each mirrored instance of the content store on the network that a users can connect to.)**;
- h. storing the localization information **(Col. 11 line(s) 18-22, teaches whereas this information is stored in a table.)**;
- i. receiving a request from a user terminal comprising a unique address that includes a link to the content store **(Col. 11 line(s) 10-12, teaches that the request is received from a user terminal with a unique address which includes a link to the content store.)**;
- j. querying the localization database to determine a preferred mirror to the user, based upon the stored localization information and the unique address **(Fig. 4 #B3-1, as shown above on pg. 7, and Col. 8 line(s) 20-22, teaches querying the localization database, based upon stored localization**

information and the unique address since it did receive the address too, to determine the preferred mirror.);

k. **dynamically generating a localized link to the preferred mirror (Col. 8 line(s) 22-25, teaches dynamically generating a link to the preferred mirror.);**

l. **and transmitting the localized link to the user (Fig. 4 #B3-3, as shown above on pg. 7, and Col. 8 line(s) 50-53, teaches transmitting the localized link to the user.).**

23. In regards to claim 31 Farber et al. disclose, a proximity resource allocation system for providing a link from any network within a plurality of networks from which a user terminal connect to a preferred mirror within a plurality of mirrors comprising a content store, comprising:

m. **a localization database comprising localization information for each mirror of the content store to each of the networks (Col. 4 line(s) 16-19, teaches a database where the localization information is stored. While Col. 11 line(s) 18-22, teaches the database information that comprises the localization information for each mirror on the of the content store to each of the networks);**

n. **and a network service provider for receiving a request from a user terminal comprising a unique address that includes a link to the content store (Col. 11 line(s) 10-12, teaches the network service provider (the reflector in this**

case) receiving a request from a user terminal with a unique address which includes a link to the content store.),

- i. **for determining a preferred mirror to the user terminal, based upon the stored localization information and the unique address (Fig. 4 #B3-1, as shown above on pg. 7, and Col. 8 line(s) 20-22, teaches determining the preferred mirror, based upon stored localization information and the unique address since it did receive the address too, to determine the preferred mirror.),**
- ii. **for dynamically generating a localized link to the preferred mirror (Col. 8 line(s) 22-25, teaches dynamically generating a link to the preferred mirror.),**
- iii. **and for transmitting the localized link to the user (Fig. 4 #B3-3, as shown above on pg.7, and Col. 8 line(s) 50-53, teaches transmitting the localized link to the user.).**

24. In regards to claim 32 Farber et al. disclose, further comprising: means to direct the user terminal to the preferred mirror upon a selection of the localized link (Col. 8 line(s) 50-53, teaches means to direct the user terminal to the preferred mirror by sending a REDIRECT command.).

Claim Rejections - 35 USC § 103

25. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

26. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

27. Claims 3, 19, and 33 are rejected under 35 U.S.C. 103(a) as being unpatentable over Farber et al. (US 6,185,598) filed on 2/10/98 and patented on 2/6/01 as applied to claims 1, 17, and 31 above, and further in view of Guyton et al. ("Locating Nearby Copies of Replicated Internet Servers" (1995)).

28. In regards to claims 3, 19, and 33 Farber et al do not disclose, wherein the localization information comprises a determined number of hops for each mirrored instance of the content store to each network from which users connect.

29. In the same field of endeavor Guyton et al. teach whereas the localization information comprises the number of hops to each content store (**pg.290 Sec. 3 – pg. 291 Sec. 5**).

30. Therefore, it would have been obvious to one of the ordinary skill in the art at the time the invention was made to modify Farber et al. optimizing network resource locations with Guyton et al. teaching as discussed above to minimize the traffic across high-level parts of an internet, such as regional and long haul links.

31. Claims 4, 20, and 34 are rejected under 35 U.S.C. 103(a) as being unpatentable over (US 6,185,598) filed on 2/10/98 and patented on 2/6/01 as applied to claims 1, 17, and 31 above, and further in view of Bohannon et al. (US PGPub 2002/0112036) filed on 11/30/00 and published on 8/15/02.

32. Farber et al. do not disclose, wherein the localization information comprises a latency for each mirrored instance of the content store to each network from which users connect.

33. In the same field of endeavor Bohannon et al. teach whereas the localization information comprises the latency (**¶0032**).

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34. Therefore, it would have been obvious to one of the ordinary skill in the art at the time the invention was made to modify Farber et al. optimizing network resource locations with Bohannon et al. teaching as discussed above to allow for the capability of the client receiving faster response and having a better experience on the site.

35. Claims 7, 9, 23, 25, 37, 39, and 40 are rejected under 35 U.S.C. 103(a) as being unpatentable over Farber et al. (US 6,185,598) filed on 2/10/98 and patented on 2/6/01 as applied to claims 1, 17, and 31 above, and further in view of Kenner et al. (US 6,003,030) filed on 10/18/96 and patented on 12/14/99.

36. In regards to claims 7, 23, and 37 Farber et al. do not disclose wherein the localization information comprises mirror server operation information.

37. In the same field of endeavor Kenner et al. teach whereas the localization information has mirror server operation information (**Col. 6 line(s) 11-12**).

38. Therefore, it would have been obvious to one of the ordinary skill in the art at the time the invention was made to modify Farber et al. optimizing network resource locations with Kenner et al. teaching as discussed above to allow for the capability of knowing which servers are performing effectively and which are not, to ensure that improve performance is being provided.

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39. In regards to claims 9, 25, and 39 Farber et al do not disclose, wherein the localization information comprises network segment information.

40. In the same field of endeavor Kenner et al. teach whereas the localization information comprises network segment information (**Col. 6 line(s) 9-12**).

41. Therefore, it would have been obvious to one of the ordinary skill in the art at the time the invention was made to modify Farber et al. optimizing network resource locations with Kenner et al. teaching as discussed above to allow for the capability of rerouting traffic away from those delivery sites and network regions that are already overloaded and toward underutilized servers and networks.

42. In regards to claims 40 Farber et al do not disclose, wherein the localization information comprises a map of IP address space within a global routing table.

43. In the same field of endeavor Kenner et at. teach whereas localization information comprises a map of IP address space within a global routing table (**Col 8. line(s) 48-67 – Col 9 line(s) 1-2**).

44. Therefore, it would have been obvious to one of the ordinary skill in the art at the time the invention was made to modify Farber et al. optimizing network resource locations with Kenner et al. teaching as discussed above to allow for the capability of rerouting traffic away from those delivery sites and network regions that are already overloaded and toward underutilized servers and networks.

45. Claim 41 is rejected under 35 U.S.C. 103(a) as being unpatentable over Farber et al. (US 6,185,598) filed on 2/10/98 and patented on 2/6/01, as applied to claim 31, further in view of Guyton et al. ("Locating Nearby Copies of Replicated Internet Servers" (1995)) above, and further in view of Kenner et al. (US 6,003,030) filed on 10/18/96 and patented on 12/14/99.

46. In regards to claim 41 Farber et al. do not disclose, wherein the localization information comprises triangulation tests and performance tests of the networks.

47. In the same field of endeavor Guyton et al. teach whereas the localization information comprises triangulation tests (**pg.294-295 Sec. 8**).

48. Therefore, it would have been obvious to one of the ordinary skill in the art at the time the invention was made to modify Farber et al. optimizing network resource locations with Guyton et al. teaching as discussed above to minimize cost of collecting the hop-count information that determines routing information to the servers.

49. Guyton et al. do not teach wherein the localization information comprises performance tests of the networks.

50. In the same field of endeavor Kenner et al. teach performance test of the network (**Col. 6 line(s) 9-12**).

51. Therefore, it would have been obvious to one of the ordinary skill in the art at the time the invention was made to modify Farber et al. optimizing network resource and Guyton et al. a method of locating nearby copies of replicated internet servers with Kenner et al. teaching as discussed above to allow for the capability of rerouting traffic away from those delivery sites and network regions that are already overloaded and toward underutilized servers and networks.

52. Claims 13, 29, and 43 are rejected under 35 U.S.C. 103(a) as being unpatentable over Farber et al. (US 6,185,598) filed on 2/10/98 and patented on 2/6/01 as applied to claims 1, 17, and 31 above, and further in view of Turnbull (US PGPub 2002/0133626) filed on 3/17/2001 and published on 9/19/2002.

53. In regards to claims 13, 29, and 43 Farber et al. do not teach, wherein the localized link is included within a webpage, and wherein the webpage is transmitted to the user.

54. In the same field of endeavor Turnbull's teaches whereas the requested link is included on a webpage and transmitted to the user (**abstract**).

55. Therefore, it would have been obvious to one of the ordinary skill in the art at the time the invention was made to modify Farber et al. optimizing network resource with

Turnbull's teaching as discussed above to allow for the capability receiving the correct format of the webpage based on the user settings.

56. Claims 14, 15, 30, and 35 are rejected under 35 U.S.C. 103(a) as being unpatentable over Farber et al. (US 6,185,598) filed on 2/10/98 and patented on 2/6/01 as applied to claims 1 and 17 above, and further in view of Goldszmidt et al. ("Load Distribution for Scalable Web Servers: Summer Olympics 1996 – A Case Study").

57. In regards to claims 14, 15, and 30 Farber et al. do not disclose, wherein the preferred mirror is determined from the request IP address or IP network of the user.

58. In the same field of endeavor Goldszmidt et al. teach whereas the preferred mirror is determined from the request IP address or IP network of the user (**Sec. 2 2nd Paragraph**).

59. Therefore, it would have been obvious to one of the ordinary skill in the art at the time the invention was made to modify Farber et al. optimizing network resource with Goldszmidt et al. teaching as discussed above to allow for the capability of filtering based on the IP address or IP network to not to overload one server over the other.

60. In regards to claim 35 Farber et al. do not disclose wherein the unique address comprises a terminal IP address.

61. In the same field of endeavor Goldszmidt et al. teach the unique address being the terminal IP address (**Sec. 2 2nd Paragraph, whereas if the preferred mirror is determined based off of the IP address, therefore the unique address would have to be the terminal IP address.**).

62. Therefore, it would have been obvious to one of the ordinary skill in the art at the time the invention was made to modify Farber et al. optimizing network resource with Goldszmidt et al. teaching as discussed above to allow for the capability of filtering based on the IP address or IP network to not to overload one server over the other.

Conclusion

63. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Lisiecki et al. (US PGPub 2002/014774) teaches content storage and replication in a managed Internet content storage environment.

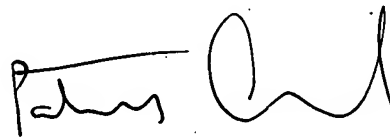
64. Any inquiry concerning this communication or earlier communications from the examiner should be directed to La Juania N. Mouzon whose telephone number is 571-270-3045. The examiner can normally be reached on Monday - Friday 8:00-5:00.

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65. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Patrick Assouad can be reached on 571-272-2210. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

66. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

LNМ

A handwritten signature in black ink, appearing to read 'Patrick Assouad', with a stylized flourish at the end.

**PATRICK ASSOUD
SUPERVISORY PATENT EXAMINER**